

**Amendments to the Specification:**

Please add the following new paragraph to the specification of this application by inserting, at the beginning thereof, the following

--This application is a divisional of Application Serial Number 09/465,298 entitled "FINE MULTICOMPONENT FIBER WEBS AND LAMINATES THEREOF" and filed in the U.S. Patent and Trademark Office on December 17, 1999, claiming priority from U.S. Provisional Application Serial Number 60/112,847 filed on December 12, 1998. The entirety of Application Serial Number 09/465,298 is hereby incorporated by reference.--

Please replace the paragraph beginning at page 1, line 20 with the following amended paragraph:

-- Generally, methods for making spunbond fiber nonwoven webs include extruding molten thermoplastic polymer through a spinneret, quenching the filaments and then drawing the quenched filaments with a stream of high velocity air to form a web of randomly arrayed fibers on a collecting surface. As examples, methods for making the same are described in U.S. Pat. No. 4,692,648 3,692,618 to Dorschner et al., U.S. Pat. No. 4,340,563 to Appel et al. and U.S. Patent 3,802,817 to Matsuki et al. However, meltblown fabrics comprise a class of melt formed nonwoven fabrics which is distinct from those of spunbond fiber webs. Meltblown fiber webs are generally formed by extruding a molten thermoplastic material through a plurality of fine, usually circular, die capillaries as molten threads or filaments into converging high velocity, air streams which attenuate the filaments of molten thermoplastic material to reduce their diameter. Thereafter, the meltblown fibers are deposited on a collecting surface to form a web of randomly dispersed meltblown fibers. Meltblown fiber processes are disclosed in, for example, U.S. Patent 3,849,241 to Butin et al.; U.S. Patent No. 5,160,746 to Dodge et al.; U.S. Patent No. 4,526,733 to Lau; and others. Meltblown fibers may be continuous or discontinuous and are generally smaller than about 10 microns in average diameter. In addition, meltblown fibers are generally tacky when deposited onto a collecting surface or other fabric.--

Please replace the paragraph beginning at page 13, line 11 with the following amended paragraph:

--As shown in FIG. 5, die tip 110 defines a polymer supply passage 130 that terminates in further passages 132 defined by die tip 110 which are commonly referred to as capillaries. Capillaries 132 are individual passages that communicate directly with opening 111 and that generally run substantially the length of die tip 110. A divider (not shown) can separate polymer streams A and B until substantially through the length of passage 130 and adjacent capillary 132. In reference to FIG. 6, which is an

enlarged cross-sectional view of die tip 110, capillaries 132 generally have a diameter that is smaller than the diameter of polymer supply passage 130. Typically, the diameters of all the capillaries 132 will be the same so as to have uniform fiber size formation. The diameter of the capillaries 132 is indicated on ~~Fig. 2~~ FIG. 6 by the double arrows designated "d, d." A typical capillary diameter "d" is 0.0145 inches. The length of the capillary 132 is indicated on ~~Fig. 2~~ FIG. 6 by the designating letter "L". Capillaries 132 desirably have a 10/1 length/diameter ratio.--

Please replace the paragraph beginning at page 17, line 34 with the following amended paragraph:

--Subsequent to the deposition of meltblown fiber layers 72, 76 and 80, spunbond fibers 83 can be deposited over the forming surface by spunbond bank 82 and, in particular, over the upper most meltblown fiber web 80, to form spunbond fiber layer 84. One or more additional layers of spunbond or other fibers can be deposited thereover as desired. Additionally, the second spunbond layer 84 can comprise identical, similar and/or a distinct material relative to the underlying spunbond fiber layer 66. As an example, one spunbond layer can be selected to provide excellent hand whereas the other can be selected to provide improved tensile strength, abrasion resistance, or other desired characteristics.--

Please replace the paragraph beginning at page 18, line 21 with the following amended paragraph:

-- As indicated above, it is possible to incorporate meltblown fiber layers of varied composition within the laminate structure. For example, a first meltblown layer can comprise a monocomponent meltblown fiber web and the second meltblown fiber web can comprise a multicomponent fiber web. As a particular example, the first meltblown fiber web can comprise a monocomponent meltblown fiber web as described in U.S. Patent No. 5,188,885 to Timmons et al., the entire contents of which are incorporated herein by reference, and the second layer can comprise a polyethylene/polypropylene bicomponent meltblown fiber web. Desirably, such a layered composite meltblown fiber web can be positioned between outer layers of polyolefin spunbond fiber webs. As an example and in reference to FIG. 8, a multilayer laminate 90 is shown comprising first and second outer spunbond layers 90A and 90B with first and second multicomponent meltblown fiber layers 92A and 92B disposed therebetween. Positioned between the two multicomponent meltblown fiber layers 92A and 92B is a monocomponent meltblown fiber layer 94. This three layer structure of meltblown fiber webs can also be reversed wherein a multicomponent meltblown fiber web is disposed between two monocomponent meltblown fiber webs. In a further aspect, crimped multicomponent ~~spunbond-meltblown~~ fiber webs can be utilized in combination with one or more monocomponent meltblown fiber webs to create a filtration gradient. In this regard, the multicomponent meltblown fiber web can have a higher loft and an average pore size greater than that of the monocomponent fiber web. Thus, filter life can be improved since larger particles can be entrapped

upstream within the multicomponent meltblown fiber web while finer particles are entrapped downstream within the monocomponent fiber web.--

Please replace the paragraph beginning at page 23, line 19 with the following amended paragraph:

--~~Example 3~~ Example 4: First and second polymers were melted and the respective molten polymer streams were separately directed through the die apparatus until just prior to the die capillary entrance. The first polymer comprised an amorphous propylene polymer (Huntsman 120 FPO) and the second polymer comprised crystalline polypropylene (Exxon 3505 polypropylene). The resulting bicomponent meltblown had a side-by-side cross-sectional configuration and the first and second components each comprised about 50%, by volume, of the fiber. The 0.6 ounce/square yard (20 g/m<sup>2</sup>) meltblown fabric had a peak load of 1.74 pounds (0.79 kg) and a peak ~~strain-strain~~ of ~~about~~ about 56% in the machine direction and a peak load of 1.04 pounds (0.47 kg) and a peak strain of about 83% in the cross-direction.--

Please replace the paragraph beginning at page 23, line 30 with the following amended paragraph:

--~~Example 4~~ Example 5: First and second polymers were melted and the respective molten polymer streams were separately directed through the die apparatus until just prior to the die capillary entrance. The first polymer comprised linear low density polyethylene (DOW 6831A LLDPE) and the second polymer comprised conventional polypropylene (~~Metnall-Montell~~ PF015 polypropylene). The resulting 17 g/m<sup>2</sup> bicomponent meltblown fabric had a side-by-side cross-sectional configuration and the first and second components each comprised about 50%, by volume, of the fiber. The meltblown fabric was juxtaposed between two nonwoven webs of bicomponent spunbond fibers. The bicomponent spunbond fibers comprised 50/50 polyethylene/polypropylene sheath/core fibers and had a basis weight of 17 g/m<sup>2</sup> each. The three layers were thermally point bonded using a pattern which bonds approximately 18 % of the surface area of the fabric. The SMS laminate had a supported hydrohead of 66 mbar, an air permeability of 70 cubic feet/minute/square foot, a cup crush energy of 2032 g-mm and an average drape of 1.74 cm in the cross-direction and 3.22 in the machine direction.--